Installing the Simple Connection Line Driver Under z/OS, z/VSE, MSP, or z/VM

This section describes the installation steps for installing Simple Connection Line Driver on a z/OS host systems.

Note:
The Simple Connection Line Driver is not supported on MSP or VM/GCS systems.

- Installation Overview

- Installation Steps

Installation Overview

To gain an understanding of the entire installation process, Software AG recommends that you read all of the installation steps before you perform the individual steps:

Step	Description
1	Verify the connectivity between cooperating nodes. This step is necessary only to support the TCP/IP line driver. It is not necessary for the Simple Connection Line Driver.
2	Unload the Entire Net-Work mainline and Entire Net-Work TCP/IP line driver libraries.
3	Outline your Entire Net-Work configuration and obtain all of the data necessary to configure the Entire Net-Work startup parameters.
4	Alter the Entire Net-Work Startup Job
5	Add the TCPX-specific DRIVER and LINK statements.
6	Configure client information. This step is necessary only to support the Simple Connection Line Driver. It is not necessary for the TCP/IP line driver.
7	Ensure that ADARUN has been linked with attribute AMODE(31). This step is necessary only to support the TCP/IP line driver. It is not necessary for the Simple Connection Line Driver.
8	Start Entire Net-Work and perform installation verifications.

Installation Steps

Step 1. Verify the connectivity between cooperating nodes .

Note:
This step is necessary only to support the TCP/IP line driver. It is not necessary for the Simple Connection Line Driver.

Before installing the Entire Net-Work TCP/IP line driver, verify the connectivity between cooperating nodes. Use the PING utility from the remote system to perform a loopback test with the local IBM TCP/IP node as follows:

```
PING node-name
```

where node-name is the name that identifies the IBM node.

Step 2. Unload the Entire Net-Work mainline and Entire Net-Work TCP/IP Line Driver libraries.

If not already performed, install the Entire Net-Work mainline libraries, using the procedure for your operating system environment (z/OS). For more information, see the section *Installation Overview* . Then unload the Entire Net-Work TCP/IP line driver components from the installation media as follows:

Under z/OS

Under z/OS, use IEBCOPY to restore the required data sets. Refer to the *Software AG Product Delivery Report* for the correct data set sequence numbers and names.

Under z/VSE

Under z/VSE, use LIBR RESTORE to restore the required data sets. Refer to the *Software AG Product Delivery Report* for the correct data set sequence numbers and names.

Under MSP

Under MSP, use MSP IEBCOPY to restore the required data sets. Refer to the *Software AG Product Delivery Report* for the correct data set sequence numbers and names.

Under z/VM

Under z/VM, use the TAPE LOAD command to unload the required data sets. Refer to the *Software AG Product Delivery Report* for the number of files that need to be forward spaced.

Step 3. Outline your Entire Net-Work configuration and obtain all data necessary to configure the Entire Net-Work startup parameters.

Note:
If you are only interested in using the Simple Connection Line Driver, this step is not necessary.

Before you set up your network parameters, obtain the following information:

For the Local IBM Node

- The name of the node;

- The number of the Adabas SVC to be used;

- The subsystem name of the TCP/IP transport provider;

- The job name or started task name of the TCP/IP transport provider;

- The well known port number (referred to on the IBM mainframe as the SERVERID parameter of the TCP/IP Driver statement) that Entire Net-Work will use to listen for incoming connections.

For Each Remote Node

Note:
This is not necessary or recommended if you plan to use the Simple Connection Line Driver.

- The name of each node;

- The node's Internet Protocol (IP) address or, if a Domain Name Resolver is being used, the Internet host name;

- The well known port number (referred to on the IBM mainframe as the SERVERID parameter of the DRIVER/LINK statement) that Entire Net-Work will use when establishing a connection to that node.

Step 4. Alter the Entire Net-Work startup job.

Make the following changes to the Entire Net-Work startup JCL.

Under z/OS

A sample startup JCL member called JCLNET is provided in the source libraries. Then add the Simple Connection Line Driver load library to the STEPLIB concatenation.

Under z/VSE

Alter the Entire Net-Work startup job to add the Simple Connection Line Driver library/sublibrary to the LIBDEF search chain. (See the sample source member JCLNET in the source library for an example of Entire Net-Work startup JCL.)

Under MSP

Alter the Entire Net-Work startup job to add the Simple Connection Line Driver load library to the STEPLIB concatenation.

Under z/VM

Under VM/GCS, alter the SETLODLB EXEC to add the WTCV*vrs* LOADLIB to the GLOBAL LOADLIB search chain. Under VM/CMS, alter the SETTXTLB EXEC to add the WTCV*vrs* TXTLIB to the GLOBAL TXTLIB search chain.

Step 5. Add the TCPX-specific DRIVER and LINK statements.

Use the Entire Net-Work configuration built in Step 3, along with the parameters of the DRIVER and (optionally) LINK statements, to create the necessary DRIVER and LINK statements for your environment in the Entire Net-Work DDKARTE input file.

Note:
If you are installing the Simple Connection Line Driver on z/VSE systems, the value of the TCPX
DRIVER's API parameter must be "CNS".

Step 6. Configure client information.

Note:
This step is necessary only to support the Simple Connection Line Driver. It is not necessary for the
TCP/IP line driver.

In order for a client to correctly send the database request to the Entire Net-Work node where the database
is located, Software AG Directory Server entries must be added for each database. These entries tell the
client application where the server (Entire Net-Work) is located and which databases it serves. A
Directory Server access entry must be added for each database that the client will call via the Simple
Connection Line Driver.

A Directory Server access entry looks like this:

XTSaccess.*targetid*[0]=*protocol://host:port*[?*parm1=value*[&*parm2=value*]...]

where *targetid* is the target database ID, *protocol* is the communication protocol to use, *host* is the name
of the host computer where the server (Entire Net-Work with the Simple Connection Line Driver) runs,
port is the port on which the server (Simple Connection Line Driver) will listen, *parm1* and *parm2* are
optional parameter names and *value* represents the values of those parameters. The port number must
match the Simple Connection Line Driver's SERVERID parameter. If one Simple Connection Line Driver
will serve multiple databases, an Access entry for each database is required, but these entries would all
specify the same port number.

For example:

```
XTSaccess.68[0]=TCPIP://ahost:3001
```

In this example, the target database is database 68. It should be accessed using the TCP/IP protocol on the
"ahost" computer at port 3001.

For more information about the Directory Server, read *Software AG Directory Server Documentation*.

Step 7. Ensure that ADARUN has been linked with AMODE(31).

Note:
This step is necessary only to support the TCP/IP line driver. It is not necessary for the Simple Connection
Line Driver.

The TCP/IP driver attempts to allocate all private virtual storage above the 16-megabyte line. To take
advantage of this feature, ensure that ADARUN has been linked with attribute AMODE(31).

Step 8. Start Entire Net-Work and verify the installation.

Because of the many possible variations of the Entire Net-Work, Adabas, and applications topology, Software AG does not provide standard installation verification procedures. However, the following procedure is suggested for verifying the TCP/IP line driver installation:

1. Start the Entire Net-Work system and make connections to each link defined to the system.

2. Test the connections and verify that the links can be established from either side by connecting and disconnecting the links several times from each node. While the links are connected, issue the Entire Net-Work operator command DISPLAY TARGET to display the targets and the nodes on which they are located.

3. Test your applications running across Entire Net-Work. At first, run one application at a time, then verify the results.

4. For the final verification test, run a load test through the network (that is, multiple users on each node accessing data on the partner node).

The following procedure is suggested for verifying the Simple Connection Line Driver installation:

1. Start the Entire Net-Work system.

2. Test your applications running across Entire Net-Work. At first, run one application at a time, then verify the results.

3. For the final verification test, run a load test through the network (that is, multiple users on each node accessing data on the partner node).